

REFERENCES

- Amir, E. I., and J. M. Amir: (1998) Recent Advances in Ultrasonic Pile Testing, Proc. 3rd Intl Geotechnical Seminar on Deep Foundation on Bored and Auger Piles, Ghent.
- Amir, E. I., and J. M. Amir: (1998) Testing Piles with Virtual Instruments Proc DFI 7th Intl Conf on Piling and Deep Foundations, Vienna.
- Amir, J. M.: (1988) Wave Velocity in Young Concrete, Proc 3rd Intl Conf on Application of Stress-wave Theory to Piles, Ottawa.
- Amir, J. M.: (1999) Caveat Emptor or a Buyer's Guide to Integrity Testing, Proc DFI Annual Conf, Dearborn
- Amir, J. M.: (2002) Single-Tube Ultrasonic Testing of Pile Integrity, ASCE Deep Foundation Congress, Vol. 1 pp. 836-850, Orlando
- Amir, J. M., E. I. Amir, and C. W. Felice: (2004) Acceptance Criteria for Bored Piles by Ultrasonic Testing, Proc. Intl. Conf on Application of Stress Wave Theory to Piling, Kuala Lumpur
- ASTM C597-83: "Standard Test Method for Pulse Velocity through Concrete," Annual Book of ASTM Standards, Vol. 04.02, Philadelphia.
- Bardet, J. P. and J. Proubet: (1991) *Adaptative Dynamic Relaxation for Statics of Granular Material*, Computer & Structures, Vol. 39, No 3.4 pp 221-229
- Bazant, Z.P. (1977) Viscoelasticity of Solidifying Porous Material – Concrete. Journal of The Engineering Mechanics Division ASCE, Vol. 103, No EM6, Dec. 1977: 1049-1067
- Braja, M. Das: (1992) *Principle of Soil Dynamics*, PWS-KENT Publishing Company
- Brown, D.: (2004) "Zen and the Art of Drilled Shaft Construction: The Pursuit for Quality." Geo-support Conference: Innovation and Cooperation in the Geo-industry, Drilled Shafts, Micro-piles, Deep Mixing, Remedial Methods, and Specialty Foundation System, American Society of Civil Engineers, Reston, VA.

Bungey, J. H.: (1980) "Validity of Ultrasonic Pulse Velocity Testing of In-Place Concrete for Strength," *Nondestructive Testing International*, Volume 13, No. 6, December.

CenGel, Yunus A. and Robert H. Turner (2001) *Fundamentals of Thermal-Fluid Sciences*, McGRAW-HILL Higher Education

Chung, H.W. (1978) "Effect of Embedded Steel Bars upon Ultrasonic Testing of Concrete" *Magazine of Concrete Research*, London, 30(102), 19.

Davis, A. G., and C. S Dun: (Dec. 1975). From Theory to Field Experience with the Non-Destructive Vibration Testing of Piles *Proceedings, Institute of Civil Engineering*, Part 2, pp. 571-593.

Department of Materials Science and Engineering, Scientific Principle- Concrete, MAST, University of Illinois Urbana-Champaign

Devaney, A. J., (1980) Geophysical diffraction tomography, *IEEE Trans. And Geoscience and Remote Sensing*, v. GE-22, no. 1, pp. 3-13.

DiMaggio, J. (2004) "Developments in Deep Foundation Highway Practice – The Last Quarter Century" *Foundation Drilling Magazine - The International Association of Foundation Drilling (ADSC)*, Vol. 24, No. 2, pp. 16-22.

Dines, K. A., and R. J. Lytle: (1979) "Computerized Geophysical Tomography", *Proc. IEEE*, and Vol. 67, pp. 1065-1073.

Ealy, C., M. Iskander, M. Justason, D. Winters, and G. Mullins (2002) "Comparison between Statnamic and Static Load Testing of Drilled Shafts in Varved Clay" *Proc. 9'th International Conference on Piling and Deep Foundations*, Nice, June 3-5, 2002.

Emborg, M and Bernander, (1994) S; Assessment of the risk of thermal cracking in hardening concrete, *Journ. Of Struc. Eng (ASCE)*. 120 (10), October.

Felice, C. W., and J. M. Amir (2005) *Observational Method and Drilled Shaft Acceptance Criteria*, Proc. Dallas

Fung, Y. C., and Pin Tong: (2001) *Classical and Computational Solid Mechanics*, World Scientific Publishing Co.

Gajda, J., and M. VanGeem: (2002) "Controlling Temperatures in Mass Concrete," Concrete International, pp. 59-61.

Gassman, S. L.: (1997) "Impulse response Evaluation of Inaccessible Foundations", Evanston, Illinois.

Hanley-Wood, (2001) Concrete Construction Magazine, Are Temperature Requirements in Mass Concrete Reasonable?, October, 68-70.

Herman, G. T.: (1980) "Image Reconstruction from Projections, the Fundamentals of Computerized Tomography" (Academic Press, Inc.).

Hertlein, Bernard H.: (1996) "NDT Methods for Dams and Waterside Structures" - Michigan Department of Environmental Quality Seminar on Dam Safety - Higgins Lake Michigan.

InfraSeis, Inc.: Nondestructive testing of Soils and Civil Infrastructures, Products and Services—network advertisement.

Instruction Manual for MODEL C-4902 and MODEL C-4901 V-meter. James Instruments, Inc., Non Destructive Testing Systems, January 1980.

Iskander M., Roy, D., Ealy, C., Kelley, S.. (2000) "Class-A Prediction of Construction Defects in Drilled Shafts". Submitted to TRB 2001 Session on Drilled Shaft Capacity & Defects in Varved Clay.

Ivansson, S. (1986) "Seismic Borehole Tomography- Theory and Computation Methods" Proc. IEEE, Vol 74, pp. 328-338.

Jones, R. (1954) "Testing of Concrete by an Ultrasonic Pulse Technique" RILEM International Symposium on Nondestructive Testing of Materials and Structures. Paris, Vol 1, Paper no. A-17, 137. RILEM Bull. No. 19, 2nd part, November.

Jones, R., and I. Facaoaru: (1969) "Recommendations for Testing Concrete by the Ultrasonic Pulse Method" Materials and Structures Research and Testing (Paris), 2(19), 275.

Komornik, A., and J.M. Amir: (1994) Quality Control at Pier NB-2, Proc. 5th Intl. Conf. DFI, Bruges.

Kosmatka, S H et.al: (2002) Design and Control of Concrete Structures, Portland Cement Association, Skokie, Ill, pp. 41-42.

Litke, S. S. (2005) Drilled Shafts: Commitment to Delivering a Quality Product, GEO3-Construction QA/QC Conference Proceedings, ADSC meeting, Dallas, TX

Lokhorst, S.J. and Breugal, K. van. (1993) The Effect of Microstructural Development on Creep and Relaxation of Hardening Concrete. Creep and Shrinkage of Concrete: Proceedings of the Fifth International RILEM Symposium, Spain: 145-150

MacGregor, J. G. (1997) “Reinforced Concrete, Mechanics and Design, “Third Edition.

MATLAB 11 (1998) Partial Differential Equations Toolbox. Mathworks, Inc., Natick, MA.

Nilson, A. H., and G. Winter: (1986) Design of Concrete Structures, McGraw-Hill Book Company, p.35

Nolet, G. (1987) “Seismic Wave Propagation and Seismic Tomography”, in Seismic Tomography with Applications in Global Seismology and Exploration Geophysics, ed. G. Nolet (D. Reidal Publishing Co.), pp. 1-23.

NSA Engineering, Inc. International Geotechnical Engineering and Ground Imaging Consultants, Products and Services – network advertisement.

Olson Engineering, Inc., Freedom NDT PCTM Family of Instruments, Products and Services – network advertisement.

O’Neil, W. M., Reese, C. L. (1999) Drilled Shafts: Construction Procedures and Design Methods. Publication No. FHWA-IF-99-025.

Pidwirny, M. Introduction to the Hydrosphere, (2000). Throughflow and Groundwater Storage, Chapter 8: PhysicalGeography.net | Fundamentals Of Physical Geography, Okanagan

Piletest.com: Pile Integrity Sonic Analyzer and Cross Hole Ultrasonic Analyzer, Products and Services – network advertisement.

Santamarina, Carlos J., and Dante Fratta: (2005) *Discrete Signals and Inverse Problems: An Introduction for Engineers and Scientists*, John Wiley & Sons Ltd.

Saul, A.G.A. (1951) "Principles Underlying the Steam Curing of Concrete at Atmospheric Pressure" *Magazine of Concrete Research*, 2(6), 127.

Scales, J. A. (1987) "Tomographic Inversion via the Conjugate Gradient Method" *Geophysics*, Vol 52, pp. 179-185.

Sheriff, Robert E. (1978) *A First Course in Geophysical Exploration and Interpretation*. International Human Resources Development Corporation, Boston.

Sheriff, R. E., and L. P. Geldart: (1995) *Exploration Seismology*, second edition, Cambridge Univ. Press, 1982, 1995.

Sims, F. (1999) *Engineering Formulas*, Industrial Press,

Springenschmid, R. and R. Breitenbucher: (1998) Influence of Constituents, Mix Proportions, and Temperature on Cracking Sensitivity of Concrete, in: R. Springenschmid (Ed.), *Prevention of Thermal Cracking in Concrete at Early Ages*, E & FN Spon, London, pp 40-50.

Stain, R. T. (1982) "Integrity Testing" *Civil Engineering*, pp.53-72.

Tufenkjian, M.R. (2003) *Nondestructive Testing for Quality Assurance and Quality Control of drilled Shafts at state Department of Transportation*. California State University, LA, CA. 49 pp.

Van Breugel, K. (1998) Prediction of Temperature Development in Hardening Concrete, in: R. Springenschmid (Ed.), *Prevention of Thermal Cracking in Concrete at Early Ages*, E & FN Spon, London, pp. 51- 75

Van Koten, H. and P. Middendorp (1981) "Testing of Foundation Piles", Heron, joint publication of the Department of Civil Engineering of Delft University of Technology, Delft, The Netherlands, and Institute TNO for Building Materials and Sciences, Rijswijk (ZH), The Netherlands, Vol. 26, no. 4.

Welty, J., C. E. Wicks, R. E. Wilson., and G. L. Rorrer (1984) *Fundamentals of Mass, Momentum, and Heat Transfer*, 3rd ed., Wiley and Sons.

Wood, David M. (2004) *Geotechnical Modeling*, Spon Press

Yuan, D., S. Nazarian, and A. Medichetti:(2003) “A Methodology for Optimizing Opening of PCC Pavements to Traffic” Texas Department of Transportation Report No. 4188-2, p.29.

Zhang, Runing. (1996) *Discrete Element Modeling of Granular Materials under Biaxial Conditions*, A thesis submitted to the Faculty of the Graduate School of the University of Colorado in partial fulfillment of the requirements for the degree of Doctor of Philosophy